

Some Relevant Aspects of the Constituents of the English Tone Unit for Formal Pronunciation Teaching*

Algunos aspectos importantes de los componentes de la unidad tónica inglesa para la enseñanza formal de la pronunciación

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*[...] the question of how people know what is going on in a text is a special case
of the question of how people know what is going on in the world at all
(De Beaugrande, 1980, p. 30).*

This paper is an attempt to provide evidence that the semantics of utterances can also be offered by intonation, and thus to point out some important aspects of the English intonation system for formal pronunciation teaching. Furthermore, on the assumption that this system plays a major role in aural/oral communication, it argues for the necessity of long-term experiments on the applicability of David Brazil's Discourse Intonation approach with beginners. It nonetheless recognises that applying it to students in a foreign-language learning environment may pose a serious challenge for teachers whose mother tongue differs from the target language.

Key words: Intonation system, formal pronunciation teaching, oral/aural interaction

Este artículo pretende evidenciar que la semántica de los enunciados también puede estar dada por la entonación, y de esa manera señalar algunos aspectos importantes del sistema de entonación del inglés para la enseñanza formal de la pronunciación. Además, partiendo del supuesto de que este sistema juega un papel importante en la comunicación oral, este artículo clama por la necesidad de experimentos a largo plazo sobre la aplicabilidad con principiantes del enfoque de entonación del discurso, de David Brazil. Sin embargo, se reconoce que la aplicación del mismo a estudiantes en un contexto de aprendizaje de lengua extranjera puede resultar un gran reto para profesores cuya lengua materna difiere de la lengua objeto.

Palabras clave: Sistema de entonación, enseñanza formal de la pronunciación, interacción oral

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Introduction

Apparently, the interpretation of a given message is dependent on a series of interrelated conditions. First, a crucial aspect for that appears to be the profiles, or the “interpenetrating biographies” (Coulthard, 1985, p. 106) of the participants: the writer/speaker on the one end of the channel, and the reader/hearer on the other. It seems, thus, that the way in which the participants perceive the world and the socio-cultural relationships involved in the process of communication is pivotal in determining how they interpret a given proposition. Schank strongly concurs with this view: “Humans understand what is said to them in terms of their own knowledge and beliefs about the world” (Schank, 1979, p. 400, quoted in Brown & Yule, 1983, p. 207). Secondly, context appears to be another key element for understanding both spoken and written texts. Firth (1957; see also Sadock, 1978, both quoted in Brown and Yule, 1983, p. 37) endorses this point by suggesting that situational contexts play an important role in understanding verbal exchanges. Furthermore, Cauldwell’s (1999) findings on his Judgements of attitudinal meanings in isolation and in context also lend credence to the relevance of contextual factors in communicative situations. The idea that context variation may be tantamount to meaning variation seems to be a tenable one (Fillmore, 1977). Consider the meaning of the word storm in the following utterance in two different contexts:

The storm began five minutes after the politician had started his speech.

Context 1: A politician is delivering a public speech in the winter in a city in the Amazon rainforest. In this scenario, storm may be synonymous with

a violent disturbance of the atmosphere with strong winds and ...with thunder and rain ... (Allen, 1990, p.1202).

Context 2: The mayor of Rio de Janeiro is publicly outlining his plans for coping with drug trafficking in that city. At this juncture, it is likely that the word storm is being employed as an umbrella term to describe the disturbance resultant of an assassination attempt perpetrated by members of drug trafficking gangs.

Finally, Brown & Yule (1983) make the point that *intonation* can be yet another non-formal meaning constrainer. One should be quick to admit, though, that predicting meanings in this way can be hard for the listener, especially because the construction of meaning based on intonation seems to be realised on a moment-to-moment basis by the speaker in real-time interactions. Perhaps this is why discourse analysts would rather focus on teacher talk than conversation outside the classroom (Sinclair & Brazil, 1982; McCarthy, 1991; Coulthard, 1985). This fact, however, should not discourage language teachers from paying particular attention to the intonation system to raise awareness in their classrooms of the pivotal role it plays in oral communication. According to Jenkins (2004), pronunciation and intonation teaching are emerging from the peripheral position to which communicative language teaching relegated it since the last quarter of the twentieth century.

In the following sections, there will be an attempt at presenting some features of the intonation systems of prominence, tone, key and termination, and their significance for satisfactory aural/oral interaction in the English language. To this end, the transcript of an original text fragment from an interview with an oyster farmer on BBC Radio 4’s

The Food Programme (Dillon, 1991) will be analysed. The objective of this paper is thus to raise awareness of the importance of these systems to the foreign and second language (henceforth L2) classroom contexts, insofar as suprasegmental features can be as important as linguistic expressions for conveying meaning in specific contexts. As Wichmann puts it: “It is well known that intonation can convey many nuances of meaning: it has the power to reinforce, mitigate or even undermine the words spoken” (Wichmann, 2005, p. 229).

Meaning through Intonation

Some Features of the Intonation System

According to Cauldwell & Allan (1998), there are three basic dimensions involved in the oral/aural communication system, namely articulatory, acoustic and auditory. They also point out that the perception of *pitch*, *loudness*, and *duration* is resultant of the interaction of the three dimensions in question (Table 1). Moreover, they go on to say that these prosodic features are the phenomena through which intonation is commonly studied. Nevertheless, perhaps due to the daunting intricacy of the matter,

many discourse analysts have chosen to describe intonation in terms of pitch alone (Coulthard, 1985).

Underhill (1994, p. 76) presents some pragmatic comments on pitch:

The vocal cords vibrate during speech. This vibration is heard as sound, and the pitch of this sound varies according to the frequency of the vibration of the cords: the higher the frequency of vibration the higher the pitch that you hear. When you sing a pitch or note you usually hold it for a time before jumping or sliding to the next note. But in speech the pitch of your voice varies continuously so that your speech is not heard as a tune. This pitch variation extends over single phonemes, sequences of phonemes, and whole utterances.

Many phoneticians believe that the stream of speech can be divided into tone units within which pitch moves (McCarthy, 1991). Furthermore, pitch movement and pitch level are intrinsically associated with four micro systems within the intonation system, which, according to Brazil (1983), comprise the constituents of the tone unit, namely prominence, tone, key, and termination (Brazil, 1994a, 1994b). Put simply, the tone unit is in its turn “produced as the smallest stretch of speech without a break in it” (Brazil, 1994b, p. 150). The articulation of these four micro systems seems to constitute the communicative value of a given tone unit (Brazil, 1983).

Articulatory	Acoustic	Auditory
Vibration of vocal folds	Fundamental frequency	Pitch
Physical effort	Amplitude (intensity)	Loudness
Timing of movements	Time	Duration

Table 1. Dimensions of spoken communication (adapted from Couper-Kuhlen, 1986, p.7, quoted in Cauldwell & Allan, 1998, p. 4).

The Significance of Prominence

Prominence, as Brazil (1994b, p. 9) points out, “is better regarded as something one can recognise only within the overall pattern of the tone unit of which it is part”. Thus, it can only be associated with pitch movement insofar as it lends itself to be the key element upon which pitch moves. In addition, it seems prominence can be described, in many cases, in the same way stress in dictionary entries is. Compare:

Dictionary entry	Tone unit
a) /nəʊ'teɪʃən/	//noT <u>A</u> tion//
b) /kə,mju:nɪ'keɪʃən/	//coMMUni <u>C</u> ation//

Apparently, there is only a shift in terminology in the comparison above. For one thing, when a one-prominent-syllable

Dictionary entry	Tone unit
'tʃi:z,peəriŋ/	either // <u>CHEESE</u> paring// or //cheese <u>PAR</u> ing//, or yet // <u>CHEESEPAR</u> ing//, but not // <u>CHEESEPAR</u> ing//

Thus, it is evident that, in the case of words having the same citation-form pattern as *cheeseparing*, the second prominent syllable either becomes non-prominent when spoken as a tone unit, since there can be no prominence after the tonic syllable within a tone unit (Brazil, 1994b), or becomes the tonic syllable of the tone unit, eliminating then the similarity between dictionary entry and tone-unit stress pattern. McCarthy seems to concur with that as follows:

word uttered in citation form, as in a), is spoken as a tone unit, its stressed syllable is labelled *tonic syllable*. For another, if it has both a secondary and a primary stress, as in b), the syllable on which the secondary stress is laid is coined *onset* (Underhill, 1994, p. 78), or *onset syllable*, according to Brazil (1985, p. 23) (e.g. coMMUnication), and the one where the primary stress is placed continues to be called *tonic syllable* (e.g. communiCation), when the word is spoken as a tone unit (Brazil, 1985, 1994b; McCarthy, 1991). However, the very fact that the tonic syllable is always the last prominent syllable in a tone unit seems to prevent further analogy between dictionary entries and tone units in terms of prominence. Notice what happens in the rare case when the secondary stress occupies the usual place of its counterpart in dictionary entries containing more than one stressed syllable:

Many other polysyllabic words may only have one *prominence* but may still have primary and secondary word stress (e.g. ¹CAta²lyst, ¹CONfis²cate, ¹WHEREa²bouts). (McCarthy, 1991, p. 95)

The distinction between dictionary-entry and tone-unit stress patterns appears to have relevant implications for formal pronunciation teaching. For one thing, if learners are denied this notion, they may have difficulty in both producing intelligible and

non-stilted utterances and in understanding native-speaker production. This is very much the case when the misleading belief that dictionary-entry phonemic notations provide the only correct pattern for pronunciation is part of the learner's conception of language learning. For another thing, even with those mature learners trained to notice the difference between these two systems of stress pattern, there is some risk of evasiveness of meaning if they lack the awareness of the significance of prominence.

A speaker's decision of giving prominence to certain words seems to be dependent on the available choices in the existential paradigm, i.e., the set of options available in a given context. This is amply exemplified in a set of three question/response pairs provided by Brazil (1985), and revisited in Coulthard (1985, p. 102), which is quoted here:

1. Q: Which card did you play?
R: //the QUEEN of HEARTS//
2. Q: Which queen did you play?
R: //the queen of HEARTS//
3. Q: Which heart did you play?
R: //the QUEEN of hearts//

Considering the composition of the pack of cards, as Coulthard (1985) suggests, in (1) the speaker had a universe of thirteen possibilities to choose from on the one hand and another of four possibilities on the other. However, in (2) the number of possibilities drops to four, since "queen" is a *given* term, that is, "queen" is part of the shared knowledge between the speakers. In the third example, there is a universe of 13 possibilities, inasmuch as the newly shared information is no longer focused on the suits. In sum, the relevant aspect about prominence is that a speaker will make prominent items that have an existential paradigm to draw on based on what he or she considers as not part of the listener's common ground, or (to use Coulthard's terms) not "interactionally given" (Coulthard, 1985, p. 104).

The Significance of Tone

There is a moot point over the characterisation of tone. It seems though that Brazil's (1994a, 1994b) simplified terminology is appropriate for work on suprasegmentals in the L2 classroom (Table 2). Additionally, although there is also broad disagreement amongst phoneticians as to






Tone	Symbol	Shape
Falling	p	
Rising	r+	
Rise-fall	p+	
Fall-rise	r	
Level	o	

Table 2. System of pitch movement.

the exact meaning pitch movement conveys, the relevance of tone variation seems to be precisely that it may have a different meaning whenever it occurs.

The prime example of this is the one choice speakers seem to make between, say, a falling tone and a fall-rise tone – proclaiming, symbol *p*, and referring, symbol *r*, respectively, to use Brazil's terminology. Compare these examples (adapted from Brazil, 1985, p. 106):

- (a) //r MARY BROWN //p is a TEACHER //
- (b) //p MARY BROWN //r is a TEACHER //

In these examples, Brazil (1985) demonstrates that referring tones are chosen when the speaker wants to convey parts of his/her message as part of the shared knowledge with the listener, and that proclaiming tones are used as an indication of addition of new items to the area of shared knowledge. Thus, in example (a) a potential hearer is “told” that the Mary Brown who is a mutual acquaintance of both speaker and hearer is a teacher, whereas in (b), the

suggestion is that, being “teachers” the topic of the conversation, the potential hearer is “told” that the acquaintance is in the teaching profession also. There is therefore an obvious correspondence between interlocutors' shared knowledge and referring tones on the one hand, and what is “news” and proclaiming tones on the other.

Importantly, the notion of common ground between interlocutors can be at the speaker's service for the purpose of ideological manipulation. Underhill points out that this is very much the case “in the speech of advertisers and politicians who may use intonation to suggest that what they are saying is already negotiated and agreed by us, and part of our common ground, even when it isn't” (Underhill, 1994, p.86). Moreover, Brazil (1994b) also adds some equally important facts about proclaiming and fall-rise tones. He points out that while *r* is the preferred tone in (i) “making-sure” questions and in (ii) “social” enquiries, *p* is normally the choice in (iii) enquiries about matters unknown to the enquirer and (iv) when information asked for is provided. Compare:¹

- i) //r i suPPOSE you don't know who the PUBlisher is// (a shop assistant to a customer in a bookshop)
- ii) //r are you enJOYing england// (a member of a host family to an exchange student)
- iii) //p WHERE'S the nearest TElephone please// (an old woman to a police officer)
- iv) //p it's next to the GREEN BUIlding madam// (the officer's response to the woman's enquiry)

1 Utterances (i) and (ii) are quoted from Brazil (1994a, p. 42-43; 45).

The choice between fall-rise (r) and rising (r+) tones equally exemplifies amply the fact that a slight shift in pitch movement may represent a shift in meaning. Although not exploring the subconscious ideological edge involved in the r/r+ system, Sinclair & Brazil (1982) suggest that the choice of either one is likely to be related to the role of the speakers involved. Hence, the choice of r+ is likely to be made by members of a specific class of interlocutors, such as teachers, interviewers, employers, and senior officers/employees, or by anyone who arrogates to themselves the role of dominant speaker. This seems to occur in extremely restricted environments, and occurs mostly because of the strength of long-established social rules as, for instance, is the case of teacher/pupil interactions. As Coulthard (1985, p. 109) makes the point:

This is not to say that pupils can't [reciprocate what teachers do], it is just that it is unusual and if they do so they are seen as doing something different from the teacher, usually they are 'being cheeky'.

The option realised by *p+* in substitution for *p* may be an indication of at least three factors involved in conversational contexts: (1) addition of new information to the speaker's own store of knowledge; (2) signalisation of turn continuation, and/or (3) "dominant-speaker status" (Brazil, 1985, p. 151). Furthermore, Coulthard (1985, p. 110) demonstrates that *p+* is also used to express feelings, such as surprise, disappointment, and enjoyment.

e.g. //p+ you've MISSEd the PLANE//

Nevertheless, it appears that the decision on whether *p+* signals surprise,

disappointment or enjoyment is commonly reinforced by situational context and body language (e.g. facial gestures) as seems to be the case in the aforementioned example. At this point, many would be likely to agree that discourse analysts would capitalise much more on Crystal's (1995) comprehensive description of tone forms than on Brazil's simplified description of pitch movement.

The Significance of Key

Sinclair and Brazil point out that key "has to do with the pitch level of the voice" (Sinclair and Brazil, 1982, p. 41), and that it describes utterances in three levels, each conveying a different meaning (Table 3). The examples offered by Brazil (1983), and further discussed by Coulthard (1985, p. 111), quoted in Table 3, seem to lend credence to that. In the light of these examples, it seems safe to suggest that key is a constituent of the intonation system that speakers can use to convey meaning at any given pitch level at which a sentence is uttered. Additionally, apart from the three meanings described in Table 3, key can also be used to express attitudes such as politeness, assertiveness and indifference (Coulthard, 1985).

The Significance of Termination

Finally, there is termination. Sinclair & Brazil (1982) demonstrate that termination is intrinsically related to key, and that the number of termination choices is limited, as demonstrated in Table 4. The information conveyed in this table suggests at least two assumptions: one is that termination can move only one step up or one step down from the chosen key level (Sinclair & Brazil,

Pitch level	Meaning	Example
High key	Contrastive	//p he GAMbled// p and LOST// (contrary to expectations; i.e. there is an interaction-bound opposition between the two)
Mid Key	Additive	//p he GAMbled// p and LOST// (he did both)
Low key	Equative	//p he GAMbled// p and LOST// (as you would expect, i.e. there is an interaction-bound equivalence between them)

Table 3. The key system.

1982); and the other is the fact that dominant speakers seem to capitalise on termination level (Brazil, 1985; Coulthard, 1985).

Sinclair and Brazil (1982) maintain that discourse analysts can choose to focus on a few termination choices, namely those involving the transition of turns in an interaction. Furthermore, they argue that in such instances termination is meaningful insofar as one speaker's termination choice

suggests his/her expectation about the other interlocutor's termination choice when responding to him/her in a conversation. Additionally, it seems that this is the case even when a turn is handed over with low termination, since the speaker's expectation here is exactly not to expect his/her listener response in any particular key-level choice. The examples in Table 4 are adapted from Sinclair and Brazil (1982, p. 154-155).

Key level	Termination level	Meaning	Example
High	High	Expectation on the part of the speaker of a <i>contrastive</i> answer: <i>yes/no</i> .	T: //p do you THINK this one's LARger// P: //p YES//
	Mid	Pressure from the speaker for a favourable response by the other interlocutor.	T: //p do you THINK this one's LARger// P: //p YES//
Mid	High	Expectation on the part of the speaker of a <i>contrastive</i> answer: <i>yes/no</i> .	T: //p do you THINK this one's LARger// P: //p YES//
	Mid	Pressure from the speaker for a favourable response by the other interlocutor.	T: //p do you THINK this one's LARger// P: //p YES//
	Low	The speaker imposes little or no constraint on the next "turn taker".	//r and the QUEStion I want to PUT to you//r+ IS//p DO we NEED//p an INcome POLicy//
Low	Mid	Pressure from the speaker for a favourable response by the other interlocutor.	T: //p do you THINK this one's LARger// P: //p YES//
	Low	The speaker imposes little or no constraint on the next "turn taker".	//r and the QUEStion I want to PUT to you//r+ IS//p DO we NEED//p an INcome POLicy//

Table 4. The termination system.

Choices Speakers Make in the Intonation Systems of Prominence, Tone, Key and Termination

This section has a two-fold goal. First, the focus will be on a tentative analysis of the transcript of an authentic excerpt from an interview on BBC Radio 4's *The Food Programme* (Dillon, 1991) (Table 5). The analysis will be in terms of the choices speakers make in the intonation systems of prominence, tone, key and termination. Nevertheless, only those examples that are clearly explicable in terms of discourse intonation will be analysed.

The Analysis

The conversation that takes place in this excerpt reveals an attempt of an oyster farmer to undermine the argument that, when oysters are eaten, there are still alive. Thus, on the one hand, the interviewer (A), apparently trying to give the farmer an opportunity to address the concerns of those antagonising the consumption of molluscs alive, prompts him to make his case at his discretion. On the other hand, the oyster farmer (B), presumably as an attempt to protect his business, tries to convince the interviewer (as well as the audience) that oysters are dead when they are eaten. Additionally, he suggests that the

A:	TU 01	//p and when you EAT them they're a LIVE //
B:	TU 02	//p NO //
	TU 03	//p THAT'S a FALL acy//
	TU 04	//o WHEN the OY ster is//
	TU 05	//p O pened//
	TU 06	//p WHEN the shell is O pened//
	TU 07	//o and the OY ster is de TACH ed from//
	TU 08	//p BOTH shells//
	TU 09	//o from the FLAT shell//
	TU 10	//r AND from its CUP shell//
	TU 11	//r the OY ster is//
	TU 12	//p WELL and truly DEAD //
A:	TU 13	//r but it was aLIVE //
	TU 14	//p a SE cond be FORE you ate it//
B:	TU 15	//p AB so LUTE ly//
A:	TU 16	//p and THAT guarant EES its FRESH ness//
B:	TU 17	//p its FRESH ness YES //

Table 5. An oyster farmer on the BBC radio 4 food programme (quoted from Cauldwell & Allan, 1998, p. 45).

fact that oysters are killed just before they are eaten is to the advantage of the consumer: it is guaranteed freshness.

In order to achieve their intent, both A and B, in addition to linguistic expressions, avail themselves of the systems of prominence, tone, key and termination. In TU 01, for instance, the speaker uses low termination, which seems to be a typical feature in the questioning style of interviewers. This is in accordance with Sinclair & Brazil's (1982, p. 154-155) suggestion that the speaker imposes little or no constraint on the hearer by using low key and termination levels (Table 4; see also Cauldwell & Allan, 1998, p. 45). The use of a proclaiming tone also lends credence to the response-prompting strategy to which many interviewers resort. By using this tone, A voices, in a non-aggressive manner, the key question: "Are oysters alive or not when we eat them?" In terms of prominence, "eat" and "alive" are stressed in TU 01. EAT is the onset syllable, the selection choice within the existential paradigm involving oyster farming in a broad sense; and aLIVE contains the tonic syllable; it is the choice within the existential paradigm involving the mollusc (e.g. as opposed to "dead").

Both key and termination are low in TU 02. Perhaps A's termination choice has influenced that of B's in this tone unit. Moreover, by using a proclaiming tone to give a negative response to A, B seems to express strong disagreement with the suggestion in A's enquiry. At this point, the meaning underlying the proclaiming tone in TU 01 needs to be revisited. In reality, what A appears to convey is the question: "Oysters are indeed still alive when they are eaten, aren't they?" Thus, the second speaker follows suit by contradicting A politely when using

low key (Coulthard, 1985) and termination in conjunction with a proclaiming tone. The monosyllabic negative expression in TU 02 limits prominence to the tonic syllable (i.e. NO as opposed to "yes").

Seemingly, the low termination in TU 03 accounts for the repetition of information contained in the previous statement (Brazil, 1994, p. 95). Thus, "That's a fallacy" means the same as "No, it isn't true that oysters are eaten alive". Similar to its occurrence in B's previous utterance, the proclaiming tone here is used to politely contradict the assumption in A's prompting. Furthermore, by giving prominence to THAT'S, B seems to signal a clear-cut delimitation of the target of his assertion. In other words, B wants to emphasise that what is "a fallacy" is the fact that "oysters are eaten alive". Finally, the fact that "fallacy" carries the tonic syllable (i.e. FALLacy) indicates that it was selected from the range of expressions available within the "false-true" existential paradigm, such as "truism", "true", and "a lie".

In TU 04, the high key seems to indicate the beginning of pitch sequence (Brazil, 1985). It marks the starting point of B's argumentation against the misleading notion, posed by A, regarding the way oysters are eaten, which appears to account for the contrastive value of key, as demonstrated in Table 3. By using a level tone in this TU, B seems to be "mentally preparing" what to say next (Brazil, 1994b, p. 55; Cauldwell & Allan, 1998). It appears that B strategically marks "when" as the onset syllable in order to call A's attention to a precise moment, which is extremely relevant to the point B is trying to make. Moreover, the tonic syllable (i.e. OYster) in this TU indicates that, from the range of choices available, it is the oyster

which concerns B, not any other mollusc (Coulthard, 1985).

Apparently, the proclaiming tone in TU 05 is an indication of the assumption of an unshared perspective on the part of the speaker (Brazil, 1994b), i.e. B is now feeding new information into the conversation. On the other hand, it appears that the reoccurrence of this tone in B's speech throughout the excerpt in Table 5 is caused by his desire to make his point convincingly, as suggested by L. Taylor (personal communication, October 31, 2002). In terms of prominence, Opened is marked as having the tonic syllable in opposition to "closed", for instance.

While the same comments about the choice of tone in TU 05 applies to TU 06, its onset syllable (i.e. WHEN), and the tonic syllable (i.e. Opened) seem to be a corollary of the relevance of "when" and "opened" in the "co-text" (The phrase is from Brown and Yule, 1983, p. 46). Seemingly, B feels the need to reiterate the emphasis on these words, which appear to be key elements leading up to the strong point he wants to make. On the other hand, one might wonder why "shell" is not prominent here. Perhaps, at this point, "shell" is synonymous with "oyster" in TU 04; there is, therefore, no need to make it prominent in TU 06 again.

It appears that the level tone in TU 07 can be equated with that of TU 04. For one thing, in both TUs, the focus seems to be on the wording of the utterance rather than on the interpersonal interactivity (Cauldwell, 2002). Thus, B appears to be mentally preparing what to say next (Brazil, 1994b; Cauldwell & Allan, 1998). For another, as L. Taylor (personal communication, October 31, 2002) indicated, both are conducive to the point that B strongly wants to make

about "opened" and "both". By marking the onset syllable (i.e. OYster), B now means the *meat*, not the *shell* of the oyster. And the tonic syllable in this TU (i.e. deTACHed) accounts for the speaker choice within the existing experiential paradigm.

Key and termination are high in TU 08, which might indicate B's assumption of the popular view that oysters are attached only to one shell; and, as an oyster connoisseur, therefore, in a dominant role, as demonstrated by Sinclair & Brazil (1982), he clarifies things. Thus, here, B is contrasting what he knows is the case with the popular view, viz. "the oyster is attached to *both* shells, not to *one* shell only" (Brazil, 1994, p. 89). The comment about the choice of a proclaiming tone in TU 05 seems to be applicable here. BOTH is marked as the tonic syllable as opposed to "one".

In TU 09, the suggestion made by L. Taylor (personal communication, October 31, 2002) is that, differently from that in TU 04 and TU 07, the level tone is a list. In terms of prominence, FLAT is used as opposed to "cup".

The use of a referring (fall-rise) tone in TU 10 seems to signal a confirmation of the comments on TU 08: B assumes it is general knowledge that oysters are attached to their cup shell; therefore, the matter must be also known to A. The expression "cup" is made prominent here in opposition to "flat", for instance.

The peculiarity of the referring (fall-rise) in TU 11 may be due to B's decision to use it instead of a level tone for creating more rapport with A (and/or the audience) (L. Taylor, personal communication, October 31, 2002). It shows, however, that "oyster" is shared knowledge between B and A (Coulthard, 1985) (i.e. it has been mentioned

earlier in the interview). The tonic syllable, *OY*ster seems to be a means of referring A back to TU 06.

Termination is low in TU 12, which appears to be essentially a reiteration of B's conviction conveyed in TU 02 and TU 03. In other words, "No. That's a fallacy" means "the oysters are *well and truly dead* when they are eaten". Additionally, this choice of termination seems to mark the end of a pitch sequence (Brazil, 1985). The comments about the choice of tone in TU 05 also seem to account for the use of a proclaiming tone here.

In TU 13, the referring (fall-rise) tone is used to reiterate the idea put forth in the opening line (i.e. oysters are still alive when they are eaten). The occurrence of the tonic syllable in this TU (i.e. a*LIVE*) indicates the choice from a limited universe, since there are only two options: one must be either alive or dead.

By using a high termination in TU 14, A seems to be contradicting what the audience might expect to hear, viz. the confirmation that oysters are still alive "a second *after*" they are eaten (Table 4). A proclaiming tone here appears to signal that A's suggestion is presented as if it were not shared, i.e. it goes against expectations (Brazil, 1994b). On the other hand, it can be said that A pitches this tone as a prompting strategy. In terms of prominence, *SE*cond is used in opposition to "minute", for instance; and *BE*FORE, as opposed to "after".

A low termination in TU 15 appears to indicate that B imposes no "constraint" on A (Sinclair and Brazil, 1982, p.155). Furthermore, this choice of termination equally reinforces the confirmation of A's statement (Brazil, 1994): "Absolutely", thus,

means the same as "Yes, it was alive a second before it was eaten".

In TU 16, A pitches a proclaiming tone in order to find out whether the matter is really true (i.e. "I want to know if that's the case.") (Brazil, 1994a). Again, it also functions as a prompting strategy employed by the interviewer. The occurrence of two onset syllables in a tone unit appears to be a rare case (Brazil, 1985, 1994b). But in this TU one can find (1) *THAT* and (2) *guarantEES*, which are made prominent before *FRESH*ness. In (1) A's seems to want to call B's attention to the relevance of the senses conveyed by TU 13 and TU 14; in (2), by selecting *guarantEES*, A emphasises *FRESH*ness, which indicates B's choice from the existential paradigm – the oyster's "bad smell" could be guaranteed instead.

Finally, in TU 17, termination is low, indicating, as Brazil (1994a) suggests, a reiteration of the information contained in the previous statement. Thus, "yes" means "freshness". By using a proclaiming tone here, the interviewee provides the information the interviewer asked for (Brazil, 1994a). Similar to the dead-alive dichotomy, "yes" is made prominent in opposition to "no".

Conclusion

In light of the analysis of the excerpt in Table 5, many would be likely to agree that the introduction of suprasegmentals in the L2 classroom, especially that of the intonation systems of prominence, tone, key and termination, cannot be seen as an easy task – and this may be much more the case for non-native teachers because of the limitations of target-language linguistic experience, a phenomenon that

is part of foreign language learners' reality (Harnsberger, 2001). Nevertheless, since these systems can both determine and add meaning to linguistic items in spoken texts, it seems that committed L2 teachers would be likely to accept this challenge irrespectively of their mother tongue and the degree of difficulty involved in the task.

It is not the case of encouraging language teachers to assign the kind of analysis conducted here to their students, inasmuch as its adequacy may be questionable even to advanced classrooms. However, teachers can always make an effort to become acquainted with the intonation system of the language that they teach, since it may help them devise sound pronunciation exercises to tackle specific pronunciation problems that might emerge in their classroom, and to help their students further develop their aural/oral communication skills.

The notion of tone unit, for instance, appears to be an important tool for developing consciousness-raising exercises on various aspects involved in the production and reception of oral texts. It is possible that the failure to notice the significance of this "smallest stretch of speech" (Brazil, 1994b, p. 150) will be one of the causes foreign/second language learners (even at advanced levels) usually have difficulty in understanding the spoken target language.

Prominence is another constituent that seems to have some significant implications for the language classroom. Among other measures, teachers can devise, for instance, remedial exercises to tackle the problem of stress misplacement, and exercises to get the students more aware of the importance of prominence for good aural/oral communication.

Finally, key and termination can also be capitalised in the language classroom. Through these constituents, teachers can call their students' attention to different ways of expressing themselves, and the way in which their pronunciation may affect their social intercourse when using the target language. Fortunately, because of advances in the investigations in the field of phonetics and phonology, language teachers have at their disposal a number of publications to deepen their knowledge of these intonation systems. Brazil's (1994a, 1994b) *Pronunciation for Advanced Learners of English*, for instance, seems to be such a useful aid. The assumption behind it is that awareness of these systems is not only pivotal for the enhancement of aural/oral fluency, but also for the development of skills in the field of semantics at an advanced level.

The adaptation of the wealth of information in the Discourse Intonation model (DI), shared by its original pioneer, David Brazil, and the other aforementioned authors, to beginner-level L2 classrooms poses another challenge to language teachers. However, given the importance of suprasegmental features for successful communication, it appears that the earlier L2-learner consciousness about DI is raised, the earlier pronunciation quality and ability to express and perceive meanings are improved (Anderson-Hsieh, Johnson & Koehler, 1992; Derwing, Munro & Wiebe, 1998, all quoted in Rossiter & Derwing, 2002). Therefore, a long-term investigation of the effects of DI on L2 beginners, considering the development of appropriate techniques to help them enhance their aural/oral proficiency, seems to be an interesting task yet to be conducted.

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